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(FILE 'USPAT' ENTERED AT 11:20:00 ON 25 AUG 1998)
L1 0 S PRENYL DIPHOSPHATE SYNTHASE#
L2 96 S (FARNESYL OR GERANYL)(2W)DIPHOSPHATE#
L3 32 S ISOPENTENYL DIPHOSPHATE#
L4 21 S DIMETHYLALLYL DIPHOSPHATE#
L5 96 S L2 OR L3 OR L4
L6 0 S L5/AB
L7 0 S L5/TI
L8 0 S 435/COR
L9 0 S 435/183-250/COR
L10 0 S 435/IOR
L11 86 S 435/193/IOR
L12 0 S 435/183-234/IOR
L13 6787 S 435/183-234/CCLST
L14 10904 S 435/183-410/CCLST
L15 1444 S 536/23.2/CCLST
L16 11332 S L14 OR L15
L17 7 S L5 AND L16
L18 0 S L17 AND (ASPART?(3A)RICH(3A)(DOMAIN# OR REGION#))

FILE 'JPO' ENTERED AT 11:38:33 ON 25 AUG 1998
L19 0 S L17

FILE 'EPOABS' ENTERED AT 11:38:53 ON 25 AUG 1998
L20 0 S L17

FILE 'USPAT' ENTERED AT 11:39:22 ON 25 AUG 1998

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1. 5,789,558, Aug. 4, 1998, Protein prenyltransferase; Patrick J. Casey, et al., **536/23.2**; **435/193**, 320.1 [IMAGE AVAILABLE]

US PAT NO: 5,789,558 [IMAGE AVAILABLE] L17: 1 of 7
DATE FILED: Jan. 31, 1994

ABSTRACT:
The present invention relates, in general, to a protein prenyltransferase and, in particular, to protein geranylgeranyltransferase (GGTase-I) and to a nucleic acid sequence encoding same. The invention also relates to methods of producing GGTase-I and geranylgeranyl modified polypeptides. The invention further relates to a method of screening compounds for the ability to alter GGTase-I activity.

2. 5,786,193, Jul. 28, 1998, Human geranylgeranyl pyrophosphate synthethase; John M. Greene, et al., **435/193**, 69.1, 252.3, 320.1; **536/23.2**, 24.31 [IMAGE AVAILABLE]

US PAT NO: 5,786,193 [IMAGE AVAILABLE] L17: 2 of 7
DATE FILED: Jun. 6, 1995

ABSTRACT:
A human geranylgeranyl pyrophosphate synthetase polypeptide and DNA (RNA) encoding such polypeptide and procedure for producing such polypeptide by recombinant techniques is disclosed. Also disclosed are methods for utilizing such polypeptide for controlling morphology of cells. Antagonist against such polypeptides and their use as a therapeutic to treat cancer is also disclosed. Diagnostic assays are also disclosed which detect the presence of a mutated form of hGGPS and over-expression of the hGGPS protein.

3. 5,786,192, Jul. 28, 1998, Farnesyl pyrophosphate synthetase and DNA sequence encoding the same; Shusei Obata, et al., **435/193**, 252.3, 252.33, 320.1; **536/23.2** [IMAGE AVAILABLE]

US PAT NO: 5,786,192 [IMAGE AVAILABLE] L17: 3 of 7
DATE FILED: Nov. 2, 1994

ABSTRACT:
A DNA sequence that encodes a stable farnesyl pyrophosphate synthetase and the use thereof are provided. DNA sequence that encodes a farnesyl pyrophosphate synthetase originating from Bacillus stearothermophilus is provided. By selecting Bacillus stearothermophilus as the gene origin of the synthetase, a production system for the synthetase, a production system for the synthetase particularly having thermal stability, can be constructed.

4. 5,773,273, Jun. 30, 1998, Geranylgeranyl diphosphate synthase and DNA coding therefor; Tokuzo Nishino, et al., **435/193**, 69.1, 69.7, 131, 252.3, 252.33, 320.1; **536/23.2**, 23.4 [IMAGE AVAILABLE]

US PAT NO: 5,773,273 [IMAGE AVAILABLE] L17: 4 of 7
DATE FILED: Mar. 24, 1995

ABSTRACT:
DNA coding for thermostable geranylgeranyl diphosphate (GGDP) synthase derived from Sulfolobus acidocaldarius is provided. The DNA is useful for production of GGDP synthase, which is, in turn, useful for production of GGDP.

5. 5,773,265, Jun. 30, 1998, DNA encoding heptaprenyl diphosphate synthetase; Ayumi Koike, et al., 435/131, 69.1, 172.3, **193**, 252.3, 252.33, 320.1, 832; **536/23.2** [IMAGE AVAILABLE]

US PAT NO: 5,773,265 [IMAGE AVAILABLE] L17: 5 of 7
DATE FILED: Jul. 24, 1995

ABSTRACT:
Heptaprenyl diphosphate (HDP)-synthetase derived from Bacillus stearothermophilus which enzymes have the amino acid sequences shown as SEQ ID NOs: 1 to 3; 1 and 2; 2 and 3; or 1 and 3, DNA encoding them, and a method of producing the enzymes.
According to the invention it is possible to industrially produce HDP-synthesizing enzyme and HPD.

6. 5,741,898, Apr. 21, 1998, DNA sequence encoding nicotiana squalene synthetase; Kathleen Marie Hanley, et al., **536/23.2**; **435/193**, 320.1; 536/23.6 [IMAGE AVAILABLE]

US PAT NO: 5,741,898 [IMAGE AVAILABLE] L17: 6 of 7
DATE FILED: Sep. 22, 1994

ABSTRACT:
A DNA sequence isolated form a Nicotiana species (e.g., Nicotiana benthamiana) has SEQ ID NO: 1. The DNA sequence encodes a polypeptide having enzymatic activity for producing squalene. The polypeptide is referred to as squalene synthetase.

7. 5,443,978, Aug. 22, 1995, Chrysanthemyl diphosphate synthase, corresponding genes and use in pyrethrin synthesis; Suzanne R. Ellenberger, et al., **435/193**, 252.3, 252.33, 320.1; **536/23.2**, 23.6 [IMAGE AVAILABLE]

US PAT NO: 5,443,978 [IMAGE AVAILABLE] L17: 7 of 7
DATE FILED: Jun. 25, 1993

ABSTRACT:
This invention provides a purified chrysanthemyl diphosphate synthase (CDS), a method for the purification of CDS from Chrysanthemum cinerariaefolium, and an amino acid sequence of the isolated CDS. Also provided is a cDNA encoding the CDS, a nucleotide sequence of the CDS gene, and a derived amino acid sequence of the encoded CDS protein. The CDS gene is useful in the enzymatic production of the natural stereospecific configuration of chrysanthemyl derivatives which are useful for the synthesis of pyrethrins, pyrethroids, derivatives thereof, as well as other classes of metabolites.